### ATENT COOPERATION TRL. TY

### From the INTERNATIONAL BUREAU

### **PCT**

#### **NOTIFICATION OF ELECTION**

(PCT Rule 61.2)

To:

Commissioner
US Department of Commerce
United States Patent and Trademark
Office, PCT
2011 South Clark Place Room
CP2/5C24
Arlington, VA 22202

Date of mailing (day/month/year) 13 November 2001 (13.11.01)

in its capacity as elected Office

International application No.
PCT/US01/02366
International filing date (day/month/year)

Applicant's or agent's file reference 886-003C1

**ETATS-UNIS D'AMERIQUE** 

International filing date (day/month/year) 24 January 2001 (24.01.01) Priority date (day/month/year) 31 January 2000 (31.01.00)

**Applicant** 

PINES, Robert et al

1	1. The designated Office is hereby notified of its election made:						
	X in the demand filed with the International Preliminary Examining Authority on:						
	30 August 2001 (30.08.01)						
	in a notice effecting later election filed with the International Bureau on:						
:	2. The election X was						
Ì	was not						
	made before the expiration of 19 months from the priority date or, where Rule 32 applies, within the time limit under Rule 32.2(b).						
l							

The International Bureau of WIPO 34, chemin des Colombettes 1211 Geneva 20, Switzerland

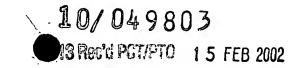
Authorized officer

Brigitte WYSS (Fax 338.87.40)

Telephone No.: (41-22) 338.83.38

Facsimile No.: (41-22) 740.14.35





#### **PATENT**

Docket No. 886-003c1US

### IN THE UNITED STATES PATENT AND TRADEMARK OFFICE **PCT Receiving Office**

Applicant(s)

: InfoNXX, Inc.

Serial No.

: PCT/US01/02366

Filed

: January 24, 2001

For

: COMMUNICATION ASSISTANCE SYSTEM AND METHOD

#### **EXPRESS MAIL CERTIFICATE**

Express Mail Label No. <u>EL757856695US</u>

Date of Deposit February 15, 2002

I hereby certify that the following attached paper(s) or fee

- 1) National Stage Transmittal
- 2) Copy of Article 34 Amendment w/replacement pages
- 3) Copy of Search Report and References
- 4) Return Postcard
- 5) Express Mail Certificate
- 6) Check #6100 for \$5660.00
- 7) Executed Oath and Declaration

is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37

C.F.R. §1.10 on the date indicated above and is addressed to the Commissioner of Patents and Trademarks,

Washington, D.C. 20231.

Greg Antrim

(Typed or printed name of perso

mailing paper(s) or fee)

Mailing Address:

SOFER & HAROUN, LLP

342 Madison Avenue, Suite 1921

New York, New York 10173

Tel:(212) 697-2800; fax (212) 697-3004

(Signature of person paper(s) or fee)

HING AUTHORITY From the INTERNATIONAL SE To: JOSEPH SOFER



342 MADISON AVE., 1921	NOTIFICATION OF TRANSMITTAL OF				
NEW YORK, NY 10173	THE INTERNATIONAL SEARCH REPORT				
, Now York, IV. 19179	OR THE DECLARATION				
	(PCT Rule 44.1)				
	D 676.15				
	Date of Mailing (day/month/year) 04 MAY 2001				
Applicant's or agent's file reference					
	FOR FURTHER ACTION See paragraphs 1 and 4 below				
International application No.	International filing date				
PCT/US01/02366	(day/month/year) 24 January 2001 (24.01.2001)				
Applicant INFONXX , INC.					
1. The applicant is hereby notified that the international search	report has been established and is transmitted herewith.				
Filing of amendments and statement under Article 19: The applicant is entitled, if he so wishes, to amend the claim					
When? The time limit for filing such amendments is nor international search report; however, for more de	tails, see the notes on the accompany sheet.				
Where? Directly to the International Bureau of WIPO	•				
34, chemin des Colombettes					
1211 Geneva 20, Switzerland Facsimile No.: (41-22) 740.14.35					
For more detailed instructions, see the notes on	the accompanying sheet.				
F1					
2. The applicant is hereby notified that no international search and Article 17(2)(a) to that effect is transmitted herewith.	report will be established and that the declaration under				
3. With regard to the protest against payment of (an) addition	al fee(s) under Rule 40.2, the applicant is notified that:				
the protest together with the decision thereon has been	transmitted to the International Bureau together with the				
applicant's request to forward the texts of both the pro	test and the decision thereon to the designated Offices.				
no decision has been made yet on the protest; the appli	cant will be notified as soon as a decision is made.				
4. Further action(s): The applicant is reminded of the following:	·				
Shortly after 18 months from the priority date, the international appli	cation will be published by the International Bureau.				
If the applicant wishes to avoid or postpone publication, a notice	of withdrawal of the international application, or of the				
priority claim, must reach the International Bureau as provided in rules 90 bis 1 and 90 bis 3, respectively, before the completion of the technical preparations for international publication.					
Within 19 months from the priority date, a demand for international preliminary examination must be filed if the applicant wishes to postpone the entry into the national phase until 30 months from the priority date (in some Offices even later).					
Within 20 months from the priority date, the applicant must perform	the prescribed acts for entry into the national phase				
before all designated Offices which have not been elected in the demand or in a later election within 19 months from the					
priority date or could not be elected because they are not bound by Chapter II.					
Name and mailing address of the ISA/US	Authorized officer				
Commissioner of Patents and Trademarks	Fan S Tsang				
Box PCT Washington, D.C. 20231	Fan S Tsang Lugenia Zugan Telephone No. 703-305-4700				
Pacsimile No. (703)305-3230	Telephone No. 703-305-4700				

Form PCT/ISA/220 (July 1998)

HING AUTHORITY From the INTERNATIONAL SE

To: JOSEPH SOFER



SOFER & HAROUN, LLP 342 MADISON AVE., 1921	THE INTERNATIONAL SEARCH REPORT					
NEW YORK, NY 10173	OR THE DECLARATION					
	(PCT Rule 44.1)					
	Date of Mailing (day/month/year) 04 MAY 2001					
Applicant's or agent's file reference 886-003C1	FOR FURTHER ACTION See paragraphs 1 and 4 below					
International application No. PCT/US01/02366	International filing date (day/month/year) 24 January 2001 (24.01.2001)					
Applicant INFONXX , INC.	1					
1. The applicant is hereby notified that the international search report has been established and is transmitted herewith.  Flling of amendments and statement under Article 19:  The applicant is entitled, if he so wishes, to amend the claims of the international application (see Rule 46):  When? The time limit for filing such amendments is normally 2 months from the date of transmittal of the						
international search report; however, for more de	etails, see the notes on the accompany sheet.					
Where? Directly to the International Bureau of WIPO 34, chemin des Colombettes 1211 Geneva 20, Switzerland Facsimile No.: (41-22) 740.14.35						
For more detailed instructions, see the notes on the accompanying sheet.						
2. The applicant is hereby notified that no international search report will be established and that the declaration under Article 17(2)(a) to that effect is transmitted herewith.						
3. With regard to the protest against payment of (an) addition	nal fee(s) under Rule 40.2, the applicant is notified that:					
the protest together with the decision thereon has been applicant's request to forward the texts of both the pro-	transmitted to the International Bureau together with the otest and the decision thereon to the designated Offices.					
no decision has been made yet on the protest; the appl	icant will be notified as soon as a decision is made.					
4. Further action(s): The applicant is reminded of the following:						
Shortly after 18 months from the priority date, the international application will be published by the International Bureau.  If the applicant wishes to avoid or postpone publication, a notice of withdrawal of the international application, or of the priority claim, must reach the International Bureau as provided in rules 90 bis 1 and 90 bis 3, respectively, before the completion of the technical preparations for international publication.						
Within 19 months from the priority date, a demand for international preliminary examination must be filed if the applicant wishes to postpone the entry into the national phase until 30 months from the priority date (in some Offices even later).						
Within 20 months from the priority date, the applicant must perform the prescribed acts for entry into the national phase before all designated Offices which have not been elected in the demand or in a later election within 19 months from the priority date or could not be elected because they are not bound by Chapter II.						
Name and mailing address of the ISA/US	Authorized officer					
Commissioner of Patents and Trademarks Box PCT	Fan S Tsang Lugenia Zogan					
Washington, D.C. 20231 Facsimile No. (703)305-3230	Telephone No. 703-308-4700					

Form PCT/ISA/220 (July 1998)

# INTERNATIONAL SEARCH REPORT

International application No.
PO 101/02366 <

A. CLAS	SIFICATION OF SUBJECT MATTER									
IPC(7) : H04M 7/00										
US CI · 379/223 219										
	International Patent Classification (IPC) or to both na	tional classification and if C								
	OS SEARCHED									
Minimum documentation searched (classification system followed by classification symbols) U.S.: 379/223,219,88.17,210,212,214,265,266,267,309										
Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched										
Electronic data base consulted during the international search (name of data base and, where practicable, search terms used) EAST, PCT Gazzette										
C. DOC	UMENTS CONSIDERED TO BE RELEVANT									
Category *	Citation of document, with indication, where ap	propriate, of the relevant passages	Relevant to claim No.							
X	US 5,479,491 A (HERRERO GARCIA et al) 26 Dec	cember 1995 (26.12.1995), column 6,	1,3-18,29-36,57,75-77							
<u>-</u> Y	line 17 - column 7, line 13.		2,19-28,37-45,56,58- 74,78,79							
x	US 5,943,417 A (COX et al) 24 August 1999 (24.08	3.1999), abstract, column 6, line 64 -	1,29,57							
	column 7, line 3.		2-28,30-56,58-79							
Y										
Y	US 6,000,031 A (BINGAMAN et al) 07 December 13-22.	1999 (07.12.1999), column 1, lines	2-28,30-56,58-79							
A	US 5,652,789 A (MINER et al) 29 July 1997 (29.07	7.1997), all.	1-79							
A,P	US 6,055,430 A (COOPER et al) 25 April 2000 (25		1-79							
Further	r documents are listed in the continuation of Box C.	See patent family annex.	at and 61th a data as an incite.							
* S	special categories of cited documents:	"T" later document published after the int date and not in conflict with the appli	cation but cited to understand the							
	defining the general state of the art which is not considered to be	principle or theory underlying the inv	ention.							
•	phication or patent published on or after the international filing date	"X" document of particular relevance; the considered novel or cannot be considered when the document is taken alone	claimed invention cannot be ered to involve an inventive step							
"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)		"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination								
"O" documen	referring to an oral disclosure, use, exhibition or other means	being obvious to a person skilled in the	he art							
"P" documen	t published prior to the international filing date but later than the date claimed	"&" document member of the same patern								
	actual completion of the international search	Date of mailing of the international se 0 4 MAY 2001	arch report							
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	nailing address of the ISA/US	1	LAMAN							
Box	mmissioner of Patents and Trademarks  R PCT	Fan S Tsang / Wylindo	Zogar							
1	shington, D.C. 20231 (a. (703)305-3230	Telephone No. 703/305-4/00	7 1							

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#### (12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

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# (43) International Publication Date 2 August 2001 (02.08.2001)

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31 January 2000 (31.01.2000) US

- (71) Applicant (for all designated States except US): IN-FONXX, INC. [US/US]; Suite 411, 3864 Courtney Street, Bethlehem, PA 18062 (US).
- (72) Inventors; and
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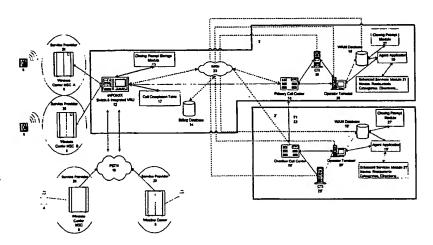
- (74) Agent: SOFER, Joseph; Sofer & Haroun, LLP, 342 Madison Avenue, 1921, New York, NY 10173 (US).
- (81) Designated States (national): AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CR, CU, CZ, DE, DK, DM, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW.
- (84) Designated States (regional): ARIPO patent (GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW), Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG).

#### Published:

— with international search report

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

(54) Title: COMMUNICATION ASSISTANCE SYSTEM AND METHOD



(57) Abstract: A communication assistance system (2) is provided for accessing information corresponding to a plurality of subscribers (6). This system is comprised of a telephone switch (12) for receiving calls from a plurality of requesters (4), a call center (16) for routing each of said received calls to an operator terminal (20), and a first database (18) configured to store said information corresponding to each of said subscribers (6). The system (2) provides: a dynamically controlled closing prompt; an interface feature allowing subscribers (6) to update their own information; a dial string translator for identifying service provider of the requester (4); a billing database (14) for transferring call charges of the subscriber (6) to the requester (4); a processor to notify subscribers (6) to update their information; the ability to store license plate numbers of the subscribers (6); a masking feature that allows system (32) to connect requester (4) to subscriber (6) without revealing subscriber's (6) mobile telephone number; a searchable database of subscriber (6) information based on particular information found in the subscriber (6) listing.



VO 01/56262





## INTERNATIONAL SEARCH REPORT

International application No.

			PC170301702300						
A. CLAS	SSIFICATION OF SUBJECT MATTER								
IPC(7) : H04M 7/00									
US CL									
According to	International Patent Classification (IPC) or to both	national classi	fication and IPC						
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	cumentation searched (classification system followed	by classificat	ion symbols)						
U.S. : 3	79/223,219,88.17,210,212,214,265,266,267,309			j					
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Documentati	on searched other than minimum documentation to th	e extent that s	such documents are included	d in the fields searched					
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Electronic da	ata base consulted during the international search (na	me of data bas	e and, where practicable, s	earch terms used)					
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C. DOC	UMENTS CONSIDERED TO BE RELEVANT								
Category *	Citation of document, with indication, where a	ppropriate of	the relevant nassages	Relevant to claim No.					
X	US 5,479,491 A (HERRERO GARCIA et al) 26 De			1,3-18,29-36,57,75-77					
^		ecember 1993	(20.12.1993), COMMIN 0,	1,3-10,29-30,37,73-77					
37	line 17 - column 7, line 13.			0.10.00.05.15.56.50					
Y				2,19-28,37-45,56,58-					
				74,78,79					
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X	US 5,943,417 A (COX et al) 24 August 1999 (24.0	8.1999), absti	ract, column 6, line 64 -	1,29,57					
	column 7, line 3.								
Y				2-28,30-56,58-79					
**	770 C 000 004 4 (DD)(G42 C427 - 1) 00 D	1000 (05 10 )		4 40 40 40 40					
Y	US 6,000,031 A (BINGAMAN et al) 07 December	1999 (07.12.)	1999), column 1, lines	2-28,30-56,58-79					
	13-22.								
A	US 5,652,789 A (MINER et al) 29 July 1997 (29.0	7.1997), all.		1-79					
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A,P	US 6,055,430 A (COOPER et al) 25 April 2000 (2:	5.04.2000), al	1.	1-79					
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Further	documents are listed in the continuation of Box C.	l Se	e patent family annex.						
	pecial categories of cited documents:	"T" lat	er document published after the inte	matismal Gling data or priority					
3	pecial categories of ched documents.		te and not in conflict with the applic						
	defining the general state of the art which is not considered to be		inciple or theory underlying the inve						
of particu	dar relevance	6779 4.							
"E" earlier an	plication or patent published on or after the international filing date		cument of particular relevance; the nsidered novel or cannot be consider						
D cannot ap	browned or benefit henremed on as exten rife resemments their and		en the document is taken alone	ted to myorke an myemite step					
	which may throw doubts on priority claim(s) or which is cited to								
	the publication date of another citation or other special reason (as		coment of particular relevance; the						
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"O" document	referring to an oral disclosure, use, exhibition or other means		ing obvious to a person skilled in the						
	published prior to the international filing date but later than the	"&" document member of the same patent family							
priority d	ate claimed								
Date of the a	Date of the actual completion of the international search  Date of mailing of the international search report								
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18 April 200	1 (18.04.2001)		<u> </u>	<u> </u>					
	ailing address of the ISA/US	Authorized	officer	2					
Commissioner of Patents and Trademarks									
Box	PCT	Fan S Tsang  Telephone No. 703-305-4/00							
	hington, D.C. 20231	700 806 4600	11-1.						
Facsimile No	o. (703)305-3230	Telephone N	40. 10343U3-9/100						

Form PCT/ISA/210 (second sheet) (July 1998)

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6 wishes a calling party to be "pre-announced" to them. If the subscriber of Wireless Apparatus 6 chooses that the calling party be pre-announced, then this pre-announcement provides an opportunity to accept or reject the inbound call. The pre-announcement feature is available to Wireless Apparatuses 6 on inbound calls from both wireless and wireline Requesters 4. Inbound calls from wireless Requesters 4 are defaulted to pre-announce "on" and inbound calls from wireline Requesters 4 are defaulted to pre-announce "off"; however, any subscriber and/or System 2 provider can decide to change this setting at any time. If the pre-announcement feature is "off" System 2 proceeds to step 124A, if pre-announcement feature is "on" then system proceeds to step 120.

Next, at step 120, System 2 consults the Pre-announcement field 59 of Call Completion Data Packet 50, to determine the method of transmitting the preannouncement. The pre-announcement can be either in text or voice format. Using the fields in Call Completion Data Packet 50, System 2 determines what format is available based on the carrier and the device capabilities of Wireless Apparatus 6. If in voice format, Switch 12 and/or an integrated Voice Response Unit (VRU) will prompt Requester 4 to state his/her name. After recording Requester 4, Switch 12 and/or the VRU replays the voice to the subscriber of Wireless Apparatus 6. It is contemplated by this invention that this same voice message of Requester 4's name can be converted to a text message and be delivered to the subscriber as described below using text pre-announcements. If the pre-announcement is in text format Switch 12 transmits the originating number of Requester 4 to Wireless Apparatus 6, or alternatively sends more complete information on Requester 4 provided it is available to System 2. Text messaging can be sent in WAP (Wireless Application Protocol) or any other protocol which is sufficient to transmit the necessary information and is supported by the Service Provider 26 of Wireless Apparatus 6.

At step 122, if the Wireless Apparatus 6 indicates acceptance of the inbound call, then see step 124A below. If the call is not accepted, see step 124B.

At step 124A, in the case where the Wireless Apparatus 6 wishes to accept the inbound communication request, Wireless Apparatus 6 indicates acceptance via

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#### WHAT IS CLAIMED IS:

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1. A communication assistance system (2) for providing access to information corresponding to a plurality of subscribers (6), the system (2) comprising:

a telephone switch (12) for receiving calls from a plurality of requesters
(4) desiring to access said information corresponding to subscribers (6);

a call center (16) coupled to said telephone switch (12) for routing each of said received calls from said requesters (4) to an operator terminal (20), being operated by a customer representative;

a first database (18) coupled to said operator terminal (20) and configured to store said information corresponding to each of said subscribers (6), including phone numbers of each of said subscribers (6); and

a closing prompt module (27) coupled to said first database (18) so as to generate a closing prompt code from a plurality of available closing prompt codes associated with a desired closing prompt message for said requesters (4).

2. The system in accordance with claim 1, wherein said database comprises a listing table (52A) associated with each of said subscribers, said listing table (52A) further comprises a wireless phone number field adapted to store wireless phone numbers of said subscribers.

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3. The system in accordance with claim 1, wherein said database comprises a listing table associated with each of said subscribers, said listing table further comprises a Special Announcement field adapted to store a closing prompt code associated with a Special Announcement closing prompt that said subscriber desires to provide to each one of said requesters.

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- 4. The system in accordance with claim 3, wherein said listing table further comprises a General announcement field adapted to store a closing prompt code associated with a General Announcement closing prompt intended to be provided to said requesters.
- 5. The system in accordance with claim 3, wherein said Special Announcement represents a recorded message associated with said subscriber.
- 6. The system in accordance with claim 4, wherein said General

  Announcement represents a recorded message associated with type of service said subscriber provides.
  - 7. The system in accordance with claim 3, wherein said Special Announcement represents marketing messages corresponding to services offered by said subscribers.
    - 8. The system in accordance with claim 3, wherein said Special Announcement closing prompt is an audio message.

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- 9. The system in accordance with claim 3, wherein said Special Announcement closing prompt is a multimedia message.
- 5 10. The system in accordance with claim 3, wherein said Special

  Announcement represents information corresponding to additional services provided relating to said subscriber.
  - 11. The system in accordance with claim 10, wherein said subscriber is a goods or service provider and said Special Announcement corresponds to an invitation to a requester to order said goods or services.

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- 12. The system in accordance with claim 11 wherein said goods are tickets to an event, including movies.
- 13. The system in accordance with claim 11 wherein said subscriber is a restaurant and said Special Announcement is invitation to make reservations to said restaurant.
- 20 14. The system in accordance with claim 1 further comprising a closing prompt storage module (13) coupled to said closing prompt module and configured to store a plurality of closing prompt messages each of which is associated with a closing prompt code provided by said closing prompt module (13).

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15. The system in accordance with claim 14 further comprising an override module coupled to said closing prompt module, said override module (66) generating closing prompt codes corresponding to announcements provided by administrators of said communications assistance system.

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- 16. The system in accordance with claim 15 wherein said announcements provided by administrators of said communications assistance system comprises cross-selling announcements relating to other features and services provided by said communications assistance system.
- 17. The system in accordance with claim 14 wherein said closing prompt module generates a call completion data packet (50) to be transmitted to said telephone switch, said call completion data packet further comprising originating phone number of the requester, telephone number of the subscriber and closing prompt codes corresponding to closing prompt messages intended to be provided to said subscriber.
- 18. The system in accordance with claim 17, wherein said closing prompt

  module further comprises a call completion data table that stores information

  necessary for populating said call completion data packet.

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19. A directory assistance system (2) for providing subscriber information to requesters (4) communication with said assistance system (2), comprising:

a telephone switch (12) for receiving calls from a plurality of requesters (4) desiring to access said information corresponding to subscribers (6); a call center (16) coupled to said telephone switch (12) for routing each of said received calls from said requesters (4) to an operator terminal (20), being operated by a customer representative;

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a first database (18) coupled to said operator terminal (20) and configured to store said information corresponding to each of said subscribers (6), including phone numbers associated with each of said subscribers (6); and a communications interface (29) for database clean-up, said interface configured to receive instructions from said subscribers (6) so as to allow said subscribers (6) to modify their corresponding information in said first database (18).

- 20. The system in accordance with claim 19 wherein said communications interface comprises a carrier customer care representative system configured to receive phone calls from said subscribers.
- 21. The system in accordance with claim 20 further comprising a carrier cleanup database (30) coupled to said customer care representative system configured to store said modified information received from said subscribers.

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22. The system in accordance with claim 21 further comprising a synchronization technology unit (32) coupled to said clean-up database unit, said synchronization technology unit further coupled to said first database, and configured to synchronize said subscriber modifications with data stored in said first database.

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23. The system in accordance with claim 19, wherein said communications interface comprises:

an Internet connection interface configured to receive modified information from said subscribers via said Internet connection; and

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an Internet clean-up database (34) coupled to said Internet connection interface for storing said modified information received from said subscribers.

24. The system in accordance with claim 23, wherein said Internet clean-up database is coupled to a synchronization technology unit so as to synchronize said stored modified data with data stored in said first database.

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25. The system in accordance with claim 19 further comprising a reward database (75) configured to store reward information corresponding to a plurality of said subscribers who modified their information.

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26. The system in accordance with claim 19 further comprising a master clean-up (40) database coupled to said communications interface unit, configured to receive and store modifications of subscriber information;

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27. The system in accordance with claim 26 comprising a synchronization technology unit coupled to said master clean-up database said synchronization technology unit further coupled to said first database, and configured to synchronize said subscriber modifications with data stored in said first database.

28. The system in accordance with claim 27 further comprising a reward database configured to store reward information corresponding to a plurality of said subscribers who modified their information.

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29. A communication assistance system (2) for providing access to information corresponding to a plurality of subscribers (6), the system (2) comprising:

a telephone switch (12) for receiving calls from a plurality of requesters (4) desiring access to said information corresponding to subscribers (6);

a call center (16) coupled to said telephone switch (12) for routing each of said received calls from said requesters (4) to an operator terminal (20) being operated by a customer representative;

a database accessible (18) by said operator terminal (20) and configured to store said information corresponding to each of said subscribers (6), including phone numbers of each of said subscribers (6); and

a dial string translator coupled to receive dial strings dialed by each one of said plurality of requesters (4) and translate said received dial strings to a

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corresponding digit sequence associated with a service provided by said communication assistance system (2).

- 30. The system in accordance with claim 29 wherein said dial string translator generates a digital string within said digit sequence that represents a telephone carrier switching center handling a call made by each one of said requesters.
- 31. The system in accordance with claim 29 wherein said dial string translator generates a digital string within said digit sequence that represents a specific language to be utilized by said system when communicating with said requester.
- 32. The system in accordance with claim 31, wherein said call center routes a requester's phone call to an operator terminal handled by a customer representative who is capable of conversing in said specific language.

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33. The system in accordance with claim 32 wherein said switch is configured to generate an incoming call information record containing a preferred language code field to store said dial string associated with said specific language.

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34. The system in accordance with claim 33 wherein said call information record further comprises a number dialed by requester field to store the number dialed by each one of said requesters.

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35. The system in accordance with claim 34 wherein said call information record further comprises an originating phone number of requester field to store the number from which each one of said requesters has dialed.

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36. The system in accordance with claim 31 further comprising a plurality of said call centers (16) remotely connected together via a communications channel, each of said call centers capable of routing a received phone call from each one of said requesters to another one of said call centers (16').

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37. A billing system for a communication assistance system (2) that provides access to information corresponding to a plurality of subscribers (6), the system (2) comprising:

a telephone switch (12) for receiving calls from a plurality of requesters (4) desiring access to said information corresponding to subscribers (6);

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a call center (16) coupled to said telephone switch (12) for routing each of said received calls from said requesters (4) to an operator terminal (20) being operated by a customer representative;

a database (18) accessible by said operator terminal (20) and configured to store said information corresponding to each of said subscribers (6), including phone numbers of each of said subscribers (6);

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a billing record database (14) coupled to said switch (12) configured to store information corresponding to amount of time requester (4) was connected to each one of said subscribers (6).

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38. The system in accordance with claim 37 wherein said billing record database further comprises information corresponding to each service provider that respectively handled a call between a requester and a subscriber.

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39. The system in accordance with claim 38, wherein said billing record database is configured to send information stored relating to billing records to a service provider that handled said call for said requester, so as to bill said requester for charges associated with said call between said requester and said subscriber.

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40. The system in accordance with claim 39 wherein said chargers include airtime utilized by said subscriber during said call between said requester and said subscriber and roaming and toll charges associated with airtime use of said subscriber.

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41. A communication assistance system (2) for providing access to information corresponding to a plurality of subscribers (6), the system (2) comprising:

a telephone switch (12) for receiving calls from a plurality of requesters (4) desiring to access said information corresponding to subscribers (6);

a call center (16) coupled to said telephone switch (12) for routing each of said received calls from said requesters (4) to an operator terminal (20), being operated by a customer representative;

a listing database (18) coupled to said operator terminal (20) and configured to store said information corresponding to each of said subscribers (6),

including phone numbers of each of said subscribers (6) and a connect field that stores information instructing said communication assistance system (2) as to whether to disclose a subscriber's (6) phone number to a requester (4).

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42. The system in accordance with claim 41 wherein said connect field further comprises information instructing said communication assistance system as to whether to disclose said subscriber's phone number to a customer representative who is handling a request from a requester.

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43. The system in accordance with claim 42 wherein said listing database further comprises a pre-announcement field (59) that contains instruction information as to whether a subscriber requires to be notified of a requester's identification information before completing a call from said requester to said subscriber.

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44. The system in accordance with claim 43 wherein said communications assistance system further comprises means to receive instructions from said subscriber as to whether to accept a call originated from said subscriber.

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45. A communication assistance system (2) for providing access to information corresponding to a plurality of subscribers (6), the system (2) comprising:

a telephone switch (12) for receiving calls from a plurality of requesters (4) desiring to access said information corresponding to subscribers (6);

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a call center (16) coupled to said telephone switch (12) for routing each of said received calls from said requesters (4) to an operator terminal (20), being operated by a customer representative;

a listing database (18) coupled to said operator terminal (20) and configured to store said information corresponding to each of said subscribers (6), including phone numbers of each of said subscribers (6); and

a processor configured to transmit notification messages to said subscribers (6) so as to receive updates for each listing corresponding to each one of said subscribers (6).

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- 46. The system according to claim 45 wherein said processor transmits said notification messages in response to a listing error discovered in said listing database.
- 47. The system according to claim 45 further comprising a service

  provider (26) configured to handle calls made by a plurality of said subscribers, said service provider transmitting modification messages to said telephone switch corresponding to changes associated with said directory listing of each of said subscribers.

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48. The system according to claim 45 further comprising a communication interface unit configured to receive modification signals from said subscribers so as to modify said directory listing corresponding to each one of said subscribers.

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49. The system according to claim 48 further comprising a reward database configured to track rewards offered to each one of said subscribers who modify a corresponding one of said directory listing.

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50. The system according to claim 48 further comprising a Voice Response Unit configured to receive phone calls from said subscribers who modify a corresponding one of said directory listing in response to prompts provided by said Voice Response Unit.

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51. The system according to claim 50 wherein said Voice Response Unit is configured to record responses made by said subscribers who modify a corresponding one of said directory listing via interaction with a customer representative.

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52. The system according to claim 45 wherein said notification messages are transmitted via a plurality of communication channels from a list including voice and data channels, WAP, SMA, instant messaging and live chat.

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54. The system according to claim 53 wherein said processor populates said

comprising personal contact listings of each one of said subscribers.

first database with information contained in said second database.

53. The system according to claim 45 further comprising a second database

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55. A communication assistance system (2) for providing access to information corresponding to a plurality of subscribers (6), the system (2) comprising:

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a telephone switch (12) for receiving calls from a plurality of requesters

(4) desiring to access said information corresponding to subscribers (6);

a call center (16) coupled to said telephone switch (12) for routing each of said received calls from said requesters (4) to an operator terminal (20), being operated by a customer representative; and

a first database (18) coupled to said operator terminal (20) and configured to store said information corresponding to each of said subscribers (6), including phone numbers of each of said subscribers (6) and license plate number corresponding to said subscriber's (6) vehicle.

- 56. The system according to claim 55 further comprising a processor for searching said first database against said license plate number so as to retrieve other information stored corresponding to each of said subscribers.
  - 57. A communication assistance system (2) for providing access to information corresponding to a plurality of subscribers (6), the system (2) comprising:

a telephone switch (12) for receiving calls from a plurality of requesters

(4) desiring to access said information corresponding to subscribers (6);

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a call center (16) coupled to said telephone switch (12) for routing each of said received calls from said requesters (4) to an operator terminal (20), being operated by a customer representative; and

a database directory listing storing information corresponding to each one of said subscribers (6), said information including a Special Services field associated with services provided by said subscriber, so as to allow a search of said database (18) against any one of said services.

- 58. The system according to claim 57 wherein said database directory listing further comprises a Device Capability field associated with capabilities of a wireless device corresponding to each one of said subscribers.
- 59. The system according to claim 57 wherein said database directory listing further comprises a Defined Locality field associated with a subscriber's preferred locality.
- 60. The system according to claim 57 wherein said database directory listing further comprises a Billing Information field associated with information corresponding with each one of said subscribers.

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61. The system according to claim 60 wherein said Billing Information field contains instructions associated with whether a requester or a subscriber is responsible for calls made by a requester to a subscriber.

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62. The system according to claim 57 wherein said database directory listing includes a NPA/NXX field containing information indicating whether a requester is calling from a wireless device or a landline device.

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63. The system according to claim 62 wherein said database directory listing further includes a Pre-Announcement field containing information indicating whether a requester is pre-announced before a voice connection to a subscriber is made.

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64. The system according to claim 63 wherein said Pre-Announcement field is defaulted to inactive when said requester is calling from a landline device and said Pre-Announcement field is defaulted to active when said requester is calling from a wireless device.

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65. The system according to claim 63 wherein said pre-announcement is made to a subscriber via audio and visual messages depending on said subscriber's preference.

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66. The system according to claim 63 further comprising a Voice Response Unit for storing pre-announcement messages that are played in accordance with information contained in said Pre-Announcement field.

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67. The system according to claim 66 wherein said Voice Response Unit stores a requester's name so as to announce said requester's name to a desired subscriber for acceptance of a call from said requester by said subscriber.

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68. A communication assistance system (2) for providing access to information corresponding to a plurality of subscribers (6), the system (2) comprising: a telephone switch (12) for receiving calls from a plurality of requesters (4) desiring to access said information corresponding to subscribers (6);

a call center (16) coupled to said telephone switch (12) for routing each of said received calls from said requesters (4) to an operator terminal (20), being operated by a customer representative; and

a database directory listing storing information corresponding to each one of said subscribers (6), said information including a Rate Plan field associated with billing rates corresponding to each one of said subscribers (6).

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69. The system in accordance with claim 68 wherein said Rate Plan field further comprises information relating to billing charges corresponding to various features associated with each one of said subscribers.

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70. A communication assistance system (2) for providing access to information corresponding to a plurality of subscribers (6), the system (2) comprising: a telephone switch (12) for receiving calls from a plurality of requesters (4) desiring access to said information corresponding to subscribers (6)

wherein said switch (12) is configured to generate an incoming call information record (15) containing a Feature Code field associated with a subscription rate plan corresponding to each one of said requesters (4);

a call center (16) coupled to said telephone switch (12) for routing each of said received calls from said requesters (4) to an operator terminal (20) being operated by a customer representative; and

a database (18) accessible by said operator terminal (20) and configured to store said information corresponding to each of said subscribers (6), including phone numbers of each of said subscribers (6).

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71. The system according to claim 70 wherein said subscription rate plan includes a flat fee subscription fee corresponding to various features and services provided by said system.

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- 72. The system according to claim 71 wherein said flat fee varies depending on the type of services subscribed by the subscriber.
- 73. A communication assistance system (2) for providing access to information corresponding to a plurality of subscribers (6), the system (2) comprising:

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a telephone switch (12) for receiving calls from a plurality of requesters (4) desiring to access said information corresponding to subscribers (6);

a call center (16) coupled to said telephone switch (12) for routing each of said received calls from said requesters (4) to an operator terminal (20), being operated by a customer representative;

a first database (18) coupled to said operator terminal (20) and configured to store said information corresponding to each of said subscribers (6),including phone numbers of each of said subscribers (6); and

a call completion table (68) coupled to said telephone switch (12) said call completion table (68) containing least cost routing information for connecting said requesters (4) to a desired subscriber (6).

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74. The system according to claim 73 wherein said call completion table further includes information for said telephone switch so as to select an outbound trunk group deemed most efficient to route a call to a subscriber.

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75. A communication assistance system (2) for providing access to information corresponding to a plurality of subscribers (6), the system (2) comprising: a telephone switch (12) for receiving calls from a plurality of requesters
(4) desiring to access said information corresponding to subscribers (6);

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a call center (16) coupled to said telephone switch (12) for routing each of said received calls from said requesters (4) to an operator terminal (20), being operated by a customer representative;

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a first database (18) coupled to said operator terminal (20) and configured to store said information corresponding to each of said subscribers (6), including phone numbers of each of said subscribers (6);

a communications interface for receiving requests for directory assistance via a requester computer terminal; and

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an access database containing a plurality of access numbers corresponding to phone listing of each one of said subscribers (6), so as to provide an assigned access number to a requester who is requesting a subscriber's (6) telephone number.

- 76. The system according to claim 75 further comprising means to provide said assigned access number to a communication terminal employed by said requester.
- 77. The system according to claim 75 wherein said assigned access number when dialed provides access to said telephone switch and said access database, so as to retrieve a corresponding subscriber's phone number for call completion by said telephone switch.
- 78. The system according to claim 77 wherein said communication terminal employed by said requester is a wireless handheld device.
  - 79. The system according to claim 77 wherein said communication terminal employed by said requester is a personal computer.